REMARKS

Status of the Claims

Claims 1-15 are pending as shown above and claims 2-5 are under active examination. As rejoinder of the method claims containing all the limitations of the examined claims is in order upon indication of allowable subject matter, cancellation of the withdrawn claims is premature.

Drawings

Applicants submit replacement drawings herewith.

Rejections Withdrawn

The rejections of claims 2 to 5 were rejected under 35 U.S.C. § 112, 1st paragraph (written description and enablement), 35 U.S.C. § 101 and § 112, 35 U.S.C. § 112, 2nd paragraph and 35 U.S.C. § 102(b) over Brennan were not reiterated and are therefore considered withdrawn.

35 U.S.C. § 102(b)

Claims 2 to 5 were newly rejected under 35 U.S.C. § 102(b) as allegedly anticipated by U.S. Patent No. 6,153,379 (hereinafter "Caskey") which was cited for teaching arrays of synthesized oligonucleotide primers ranging from about 7 to about 30 nucleotides in length. (Office Action, page 3). The Examiner also asserted that Caskey's statement that their array includes "oligonucleotide primers comprising all possible N-mers" was "deemed to meet a limitation of each of claims 2-5." *Id.*

Applicants traverse the rejection and supporting remarks.

The pending claims are drawn to polynucleotide-including arrays in which the polynucleotides consist only of sequences corresponding to accessible regions of cellular chromatin. The accessible regions are isolated based on altered reactivity to a probe of chromatin structure (as compared to reactivity of bulk chromatin to that same probe). In addition, the claims require the sequences on the array to be at least 25 nucleotides in length. Thus, while the solid surface array may comprise elements in addition to the polynucleotide sequences, each and

every polynucleotide sequence on the array consists of a sequence corresponding to an accessible region.

By contrast, and as acknowledged by the Examiner, the oligonucleotides on Caskey's arrays do not consist of sequences corresponding to accessible regions. The continued insistence by the Examiner that the claims are anticipated by any reference that discloses oligonucleotide arrays is unfounded. In the instant case, the claims are drawn to arrays that comprise a plurality of polynucleotide sequences. Nonetheless, each and every polynucleotide sequence on the array corresponds to an accessible region of cellular chromatin (isolated based on altered reactivity to a probe of chromatin structure). Thus, the polynucleotides on the claimed arrays are not random as all of them correspond to an accessible region. Therefore, the claimed arrays are clearly structurally distinguishable (in sequence) from Caskey's "all N-mer" oligonucleotide arrays -- whereas the sequences of the claimed arrays include only sequences corresponding to accessible regions, Caskey's random (or all N-mer) arrays will necessarily include sequences corresponding to non-accessible regions.

Therefore, because Caskey does not disclose all the elements of the claims and because the evidence or record clearly establishes that the recited process steps impart structural limitations that distinguish the claims from the arrays of the cited reference, Caskey cannot anticipate any of the pending claims and withdrawal of the rejection is in order.

CONCLUSION

In view of the foregoing amendments and remarks, Applicants submit that all of the pending claims are in condition for allowance and request early notification to that effect.

Should the Examiner have any further questions, Applicants request that the undersigned be contacted at (650) 493-3400.

Respectfully submitted,

Date: March 30, 2009

By: 

Dahna S. Pasternak
Registration No. 41,411
Attorney for Applicants

ROBINS & PASTERNAK LLP
1731 Embarcadero Road, Suite 230
Palo Alto, CA 94303
Tel: (650) 493-3400
Fax: (650) 493-3440